

Occurrence of the Yellow Plum *Ximenia americana* L. as a tidal strand-line plant in Darwin Harbour

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The shrub *Ximenia americana* L. (Olacaceae) has a pantropical distribution. In keeping with its wide occurrence it has an array of common names including Yellow Plum, Hog Plum, Monkey Plum, Nicaraguan Plum, Sea Lemon, Bush Lemon, Tallow Nut, Tallow Wood, Gotoobah and Wild Apricot. It also has the distinction of being the first recorded western identification of any plant in Australia, this being made on 21 September 1606 by Don Diego de Prado y Tovar, a member of Torres's expedition. That plant was observed on an island, possibly Long Island, in Torres Strait (Windolf 2000). Until recently, all Australian records were from Queensland (George 1984), but Liddle *et al.* (1994) recorded it from five coastal localities in the Northern Territory. In this note, we report a new locality for the species, Talc Head (12°29' S, 130°47' E) in Darwin Harbour, 75 km south-west from the nearest previously reported location at Cape Hotham. A collection, *C.P.Mangion and D.C.Franklin 1080*, is lodged in the Northern Territory Herbarium.

Aboriginal people from Darwin and Belyuen knew of *X. americana* at Talc Head. This information was passed to the Talc Head manager, Duncan McRae, who in turn drew the plant to the attention of members of the local scientific community including ourselves. Two plants have been located, 50 m apart, both just above the high-tide mark of the Mandorah-side beach below the Talc Head hostel. Both are growing on white beach sand at the base of small kaolinite cliffs. One of these "plants" has four distinct stems which may be separate plants or perhaps the product of suckering or layering. Both occur in coastal vine-thicket, in which some of the component species frequently occur on tidal strand-lines and others are generalist vine-thicket plants (Table 1).

Ximenia americana is a spreading semi-parasitic scandent shrub to 5 m tall with branches bearing thorns. Stems curve out and down, possibly promoting layering. The leaves are elliptic to obovate, to 50 mm long or sometimes longer. The 25-50 mm long fruits bear a strong but superficial resemblance to miniature lemons, but are drupaceous, comprising a single hard-walled seed container (a "stone") surrounded by a relatively thin fleshy outer layer (exocarp) which is yellow when ripe. The flowers are small and white or pale yellow (George 1984). At Talc Head, the plants observed were 5 m tall

by 5 m across and 3 m tall by 6 m across respectively, with prominently wavy margins to the leaves. Information from herbarium specimens, personal observations and those of D. McRae indicate that *X. americana* flowers and fruits sporadically throughout the year.

All Northern Territory collections of *X. americana* are coastal, and most are from Co-bourg Peninsula eastwards. At least three are of isolated individuals which grow immediately above the tidal strand-line (G. Wightman pers. comm.), although in Queensland the species is by no means confined to the tidal strand-line nor even coastal districts (George 1984). Isolated tidal strand-line occurrences suggest fruit dispersal on ocean currents, a feature confirmed by Guppy (1906), Pike & Leach (1997) and Smith (1999).

Table 1. Plants associated with *Ximения americana* at Talc Head. Species marked with an asterisk are frequently associated with tidal strand-lines.

Species	Common name
<i>Abrus precatorius</i>	Crabs-eye Vine
<i>Acacia holosericea</i>	Candelabra Wattle
<i>Aidia racemosa</i>	Archer Cherry
<i>Bambusa arnhemica</i>	Top End Bamboo
<i>Capparis sepiaria</i>	Wild Orange
<i>Celtis philippensis</i>	Celtis
<i>Cordia subcordata</i> *	Sea Trumpet
<i>Denhamia obscura</i>	Orange Root
<i>Dioscorea bulbifera</i>	Round Yam
<i>Drynaria quercifolia</i>	Basket Fern
<i>Drypetes deplanchei</i>	Grey Boxwood
<i>Flagellaria indica</i>	Supplejack
<i>Flueggea virosa</i>	White Currant
<i>Glycosmis trifoliata</i>	Pink Lime
<i>Hibiscus tiliaceus</i> *	Beach Hibiscus
<i>Hypoestes floribunda</i>	Rosy Hypoestes
<i>Lindsaea ensifolia</i>	Common Wedge Fern
<i>Lysiphyllum binatum</i>	
<i>Memecylon pauciflorum</i>	
<i>Mimusops elengi</i> *	Red Condoe
<i>Notelaea microcarpa</i>	Small-fruit Mock-olive
<i>Pachygone ovata</i>	
<i>Premna acuminata</i>	
<i>Psychotria nesophila</i>	Gabu
<i>Scleria lithosperma</i>	
<i>Stenocarpus verticis</i>	
<i>Strychnos lucida</i>	Strychnine Tree
<i>Tacca leontopetaloides</i>	Polynesian Arrowroot
<i>Trophis scandens</i>	
<i>Zanthoxylum parviflorum</i>	Prickly Tree
<i>Ziziphus oenopolia</i>	Wine Jujube

Guppy (1906) also noted that frugivorous birds consume, and may thus disperse the fruits, which presumably accounts for its non-coastal occurrences in Queensland.

The fruit of *X. americana* is reported to be refreshing and tasty to eat if collected after falling, but astringent whilst still on the tree (D. McRae pers. comm.). It is sought out by Aboriginals from Belyuen (D. McRae pers. comm.), and also on Cobourg Peninsula (Blake *et al.* 1998). In Africa, it is also a favoured bush food. The seeds are rich in iodine-bearing oils (Eromosele *et al.* 1994), but may be poisonous (Smith 1999). The young leaves are edible after cooking (Cribb & Cribb 1974). In Fiji, the fruit and timber is utilised. It is also a significant bush medicine, and stem bark extracts have shown positive indications as a treatment for the HIV AIDS virus (Asres *et al.* 2001).

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